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BSC Participant Test Service

User Guide

This document describes the BSC Participant Test Service, and outlines the actions required by BSC Participants in order to use the service

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BSC Central Services Director	BSC Central Services
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c Change History

Version 1.0 authorised for use.

d Changes Forecast

This document will be updated to reflect operational experience of the Participant Test Service.

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e Related Documents

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1 INTRODUCTION

1.1 Purpose

The purpose of this document is to provide participants with details of the Participant Test Service (PTS) to enable them to make effective use of the service. This document does not provide an overall description of the operation of the BSC services – instead it identifies where the PTS differs from the operational service, and provides details for accessing the test service. It is assumed that the audience for this document has a good understanding of the operation of the BSC Central Services, and how participants interact with those services.

1.2 Scope

Issue 1.0 of this document covered the initial service (ECVAA), which was available for use from 4 March 2002 through to 5 July 2002. Issue (4.0) of the document includes details of an extended Participant Test Service, which includes CRA, SAA, CDCA & ECVAA, available from 8 July 2002. Note that BMRA is not currently included in the full PTS.

This document is aimed at the booking and use of the PTS Test Environment only. Further details associated with the use of the Structured Test Environment can be found in 'BSC Systems Delivery Programme–Management of Testing using the Participant Test Service Structured Environment'.

1.3 Summary

The Modifications Process, as defined in the BSC, facilitates the proposal, assessment and implementation of changes to the BSC. Such changes to the BSC must be reflected in the service agreements and computer systems that support the day to day operational aspects of the BSC requirements. Similarly changes to processes or BSCP's may give rise to changes to computer systems. The nature of some changes can be expected to impact the interactions between the central computer systems and those of participant companies. A test service that is similar in nature to the live BSC systems is made available to increase the level of assurance, to individual companies, and to the industry as a whole.

The Participant test service is expected to be of benefit to four broad categories of user, these are:

- BSC Parties / Party Agents;
- New Entrants;
- Third Party software developers; and
- ELEXON.

The test service typically operates with the same application software as the corresponding live service, and will have in place much of the live base data – thus enabling participants to test against the service in a near-live environment.

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The PTS environment is available (via a booking system) for participants to carry out whatever testing they require.

It is expected that the PTS will be used for the following types of testing:

- For structured testing of new releases of central services software – this will be managed by ELEXON (in the structured environment) as part of the pre-release assurance for the service;
- To allow participants to test against new versions of the Central Services;
- To allow participants to test new versions of their software against the existing services;
- To allow participants to test scenarios or situations prior to their use in live;
- To provide a facility for non-participants (for example, software vendors).

The remainder of this document describes the PTS in more detail and is arranged as follows:

Section 2	provides an overview of the PTS;
Section 3	provides a summary of the actions required before participants can use the PTS;
Section 4	gives details of using the system and the test booking procedure;
Section 5	gives details of the Participant support provided;
Section 6	provides details of connecting to the PTS;
Section 7	explains the approach to data population of the PTS;
Section 8	explains the mechanism for handling manual flows;
Section 9	explains the mechanism for handling electronic flows and reports;
Appendix A	provides the booking form and forms for submitting manual flows.

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2 OVERVIEW OF PARTICIPANT TEST SERVICE (PTS)

This section provides an overview of the PTS and, in general terms, the service characteristics.

The PTS supports 1 BSC system environment; which will be available to participants for informal and self managed testing, this is referred to below as the 'PTS' environment.

The PTS environment is available for use by BSC Parties, Agents and other non BSC Parties as authorised by ELEXON.

2.1 PTS Environment

The PTS test environment will be available to users for participant focused testing. The booking process will ensure that no one, or group of, users exploit use of the PTS to the detriment of others.

The most complex aspect of the Participant Test Service is the test data and as such is likely to be the area that imposes the most restrictions on users. Such restrictions might be in the form of the type of data available and therefore the nature of testing possible. Similarly the data set up required by one group of users might not be consistent with the data set-up preferred by another user or group of users.

The number of PTS users that may concurrently use the service will depend on:

- The number of bookings received for any given Test Slot / week
- The nature and complexity of the testing activities each user wishes to undertake
- The effort required for data set-up in advance of testing
- The nature of any PTS maintenance required during any given Test Slot / week.

Limits on the number of simultaneous users wanting to undertake testing in the PTS test environment may be imposed from time to time. These limits will only be imposed for practical reasons and an overall cap of 20 simultaneous users has been set. This cap will be kept under review following operational experience. This User Guide concentrates on the arrangements for the PTS environment.

2.2 Software Versions

In general the test environments mirror the live system – both in terms of the base data and the versions of the software applications. However, there will be occasions when the software is different between the live and one or other test environment – for example:

- Patches may be applied to the live service before they are applied to the test environments. In general the test environments will be patched at approximately the same time but there may be a short lag.
- Some patches may be applied to one or both test environments for final proving before being released to live.
- Data will be copied from the live environment into the test service from time to time to ensure that they do not drift too far out of 'sink'.

In general, participants will be informed of such variations if there is any impact on them.

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3 SUMMARY OF ACTIONS REQUIRED BEFORE USING THE TEST SERVICE

This section provides a high level summary of the steps that prospective PTS users will need to take before connecting to and using the service. The summary provided below includes the activities supported by both ELEXON and those supported by the PTS Service Provider.

Step	Activity	Notes
1.	Read User Guide	The User Guide supports users through all aspects of use of the PTS. The Guide covers Booking, provisions and restrictions, manual flow (BSCP) forms, PTS connection and the practicalities of use
2.	Make booking Request	Appendix A of this User Guide includes a booking form which should be used to request a PTS 'Test Slot'. This can be found on pages 23-26. A connection date needs to be specified. These details must be sent to bscservicedesk@cgi.com and received by ELEXON at least 10 working days in advance of the requested 'Test Slot'
3.	Receive booking confirmation	Users will be given confirmation (or rejection) of their requested Test Slot 10 working days before the test slot.
4.	Obtain Connection information from the Test Service Provider	Before the day of the test, it is necessary to set up the connection between your system and the PTE system. This will involve the exchange of public encryption keys.
5.	Connect	At the start of the agreed Test Slot, users should successfully connect to the PTS (via existing network infrastructure) and commence agreed testing.
6.	Disconnect	Once the agreed test slot is over the Party should disconnect from the Test System Immediately.

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4 USING THE PTS

4.1 Overview

The PTS service will be booked on a first come, first served basis. An alternative date will be suggested if the requested date is unavailable.

It should be noted that it is reasonable to expect periods when the PTS will not be available due to technical reasons. Re-scheduling of bookings will be required following such periods. here possible these will be factored into the schedule of agreed bookings.

Requests for access to the PTS should be for half days, with a minimum of 1 and a maximum of 10, for any one company, in any given week.

The PTS booking arrangements will be kept under review by ELEXON following operational practice and modified in light of the experience gained in the way the PTS is used.

4.2 Booking Use of the Participant Test Service

The PTS booking process is formalised by the following steps:

Step	Who	When	What
1.	User	A minimum of 2 weeks before test date.	Participants wishing to book a Test Slot should in the first instance contact bscservicedesk@cgi.com and request a Test Slot using the booking form in the Appendix. The information provided should include: • Company Name • Contact details • BSC Party ID • Days and dates requested (Monday to Friday) • Signed Testing Agreement letter (non BSC Parties only) – Please see section 4.3 • Detailed descriptions of the nature of testing to be undertaken and the flows expected to be used Bookings can be cancelled without penalty up to 5 working days before the test date. Cancellations made after this deadline will be charged booking they must contact ELEXON. After that point

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			the Party will be charged for any unused test slots.
2.	CGI UK Ltd	Once booking request is received	CGI UK Ltd will confirm that the booking slot can be accommodated and send a confirmation to the User making the request.
3.	CGI UK Ltd	At least 5 Working Days before the first test	The User will be contacted to confirm connections to the system.

The information required in Step 1 should be provided on Form 1, in Appendix A, and emailed to bscservicedesk@cgi.com.

4.3 Provisions and Restrictions

In accordance with the 14 February 2002 Panel decision, a Test Slot cost recovery fee of £820 will be charged, for each Test Slot, and invoiced as a BSC Specified Charge.

A BSC Party shall be charged any relevant Usage Fees as a BSC Specified Charge. The Usage Fee shall be set in accordance with Section 6.1 of Annex D-3 to Section D of the BSC.

Non-BSC Parties wishing to use the Participant Test Service are required to sign a Test Service Agreement letter available on request from ELEXON Test Service Controller, ELEXON, 4th Floor, 350 Euston Road, London. This must be completed before the test slot can be booked.

The Test Service Agreement letter sets out the terms and conditions under which non-BSC Parties shall be provided access to the Test Service.

Unless otherwise instructed by ELEXON, a non-BSC Party is only required to provide 1 signed Test Service Agreement letter to ELEXON and need not provide duplicate letters each time they request access to the PTS. However, ELEXON reserves the right to terminate or vary the terms of the Agreement at any time

The User accepts that the "BSC Participant Test Service User Guide" places no obligations on the Service Controller unless explicitly stated.

The Service Controller accepts no responsibility for the User's testing or the results of such testing.

The Service Controller makes no guarantee that the BSC Central Systems in use by the PTS Participant Test Environment shall mirror the BSC Central Systems in use in the live environment, both in terms of the base data and the versions of the software systems. However, the Service Controller shall attempt to keep the User informed of such variations if there is any impact on the User.

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Test Slots are booked at the Service Controller's absolute discretion. The Service Controller reserves the right to refuse the User a Test Slot at any time and for any reason.

The Service Controller reserves the right to cancel Test Slots at any time and for any reason.

By requesting a Test Slot and subsequently receiving a Test Slot confirmation the User accepts that it will be liable for the prevailing Participant Test Service Charges as endorsed by the BSC Panel.

The User accepts that use of the PTS Participant Test Environment is restricted only to the Specified Testing during an agreed Test Slot. Any further testing must be agreed with ELEXON prior to use.

The User accepts that any changes to the arranged test slots must be received at least five working days before the test date otherwise the user will be charged for the arranged bookings.

The Service Controller reserves the right to place further formal constraints on the use of the PTS Participant Test Environment prior to or during any Test Slot. These constraints may be varied upon instruction from the Service Controller to the User at any time. However, notwithstanding any such constraints, the Specified Tests carried out by the User during its Test Slot shall be at the discretion of the User. The Service Controller shall not be responsible for defining or managing the Specified Tests, or checking the results.

The Service Controller reserves the right to monitor the User's activities at any time during a Test Slot.

The Service Controller reserves the right to restrict the availability of Test Data to the User.

The User accepts that limited support resources are available to support the Participant Test Service and such resources may be constrained from time to time.

Whilst a number of safeguards are in place to separate test flows from live (i.e. different IP addresses, FTP logins, Test Flags) it is the Users responsibility to ensure that these are employed correctly to prevent test data from entering the live service and similarly to prevent live data from entering the Participant Test Service.

The User accepts that they must disconnect from the Test Service.

By making a Participant Test Service booking request Users confirm that they accept and agree to the provisions and restrictions set out in the Participant Test Service User Guide.

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5 PARTICIPANT SUPPORT

Participant support associated with the PTS can usefully be separated into support provided by ELEXON and the support provided by the Test Service Provider (CGI UK LTD).

Participant Test Service support does not include assistance to participants for:

- writing scripts related to any part of PTS use; or
- producing expected results for checking purposes.

Responsibility for these activities remains with each individual user. As well as entering into contracts with other users, participants may enter into contracts with the Dummy participant that can be provided for as part of the Participant Test Service data set-up (see section 7.3).

Whilst the above activities are not supported by the Test Service Provider, ELEXON Participant Operational Support Analysts, contactable via the ELEXON helpdesk, may be able to offer some help and advice.

5.1 Support Resources

The PTS support resources, particularly those provided via the Test Service Provider to facilitate connection and basic use of the PTS, on any given day are necessarily limited and must be apportioned equally amongst the booked PTS users.

5.2 Hours of Operation

The service is only supported during normal office hours (09:00 – 17:00, Monday to Friday).

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6 CONNECTING TO THE PTS

6.1 General

The PTS environment uses a separate IP address to that of the Live environment, thus providing separation. There is access via high- grade and low-grade FTP services as in the live environment. No BMRA web access or TIBCo publishing is provided in the service.

Participants will be provided with separate FTP logins for each of their Participant IDs. The same logins will apply to both high and low grade where applicable.

6.2 Test Flags

To provide additional separation, and to facilitate the routing of flows within participant organisations, the PTS uses the following Test Flag (last item in the file header) on all flows sent and received:

PTS Environment	**Test Flag**
PTS Environment (PTE1)	TR01

These test flags provide an extra level of assurance that live data flows are not received by the PTS or vice versa. Any electronic flow received by a system must have the correct test flag – otherwise the flow will be rejected. Similarly, flows sent from the PTS will contain the appropriate test flag – thus allowing a similar check to be carried out by participant systems.

6.3 Sequence Numbers

Sequence numbers on flows within the test environments will be validated in an identical way to the live system – although they will be distinct from the live system. For each test system the flow sequence number will (by default) start from
1, and will be independent of the other test system, and the live system. Changes
to the sequence number to be used can be requested at any time before the test with the lead support personnel from CGI

6.4 IP Addresses

There is FTP access via a high-grade link, and a low-grade (internet) link. The addresses / names used are as follows:

Service	**Address / Name**	**Comments**
High Grade FTP	192.168.253.2	Available via high-grade private network only
Low-Grade FTP	62.73.154.205 ptsftp.bmreports.com	

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Initially, all connections have been configured such that participants are to "pull" files from the central systems. Participants can request that this is changed so that the Test Service Provider "pushes" files to their systems, if necessary using different IP address and login details to those used in live – Form 15 in Appendix A should be used to request this change.

6.5 Encryption Keys

Initially the same encryption keys will be used for the PTS as used in live. These can be changed on request by contacting the Test Service Provider PTS Support.

6.6 Connection Tests

When a participant first connects to the PTS (prior to their first Test Slot) an initial connectivity test will be carried out. The Test Service Provider will contact the participant and arrange for one or more sample files to be transferred. This test will prove that the communications infrastructure is working.

6.7 Connection Duration

Participants will be permitted to connect to the PTS up to one week prior to the test slot. Test files may only be sent to the PTS environment during the test period. Participants are not permitted to remain connected to the PTS system after the test slot has been completed and will be disconnected from the system when the slot has finished.

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7 TEST DATA

The base data within the PTS is a snapshot of the base data from the live system. Significant changes to the live data (such as new participants) will be reflected in the PTS. Participants will be able to make some changes to the test data (see below) – this may result in the test and live data diverging over time. The PTS environment is "refreshed" with a copy of the live system approximately once a month. As a result, some recent data may be missing but can be added on request.

For up to date information regarding the standing data and or settlement day data available in the PTS please email bscservicedesk@cgi.com.

7.1 CRA Registration Data

Most of the CRA registration data is included in the data load, including the following:

- BSC Party and Agent Registrations.
- Authorised Signatures.
- BM Units.
- Trading Units
- Metering Systems and Technical Details
- Aggregation Rules.

Note that the authorised signature details have been copied from live, and these will be used (name only) to check manual flows being submitted to the PTS. Participants are able to change the authorised signatures for the test environments using a modified version of BSCP 38, available in the appendix

Participants are also able to change parameters associated with their BM Units (such as the Demand or Generation Capacities, or CALF). They are also able to change contact details associated with their Party or Agent registrations.

Participants are not permitted to add / delete BMUs, or change other registration details unless agreed with CGI.

7.2 ECVAA Data

The following ECVAA data has been replicated from live:

- ECVAA Agent Authorisations (ECVNAA & MVRNAA);
- ECVAA Authorisation Keys;
- Credit Limit Data.

The above ECVAA data can be changed by participants. Authorisations can be terminated, new authorisations created, and keys changed, subject to the normal authorised signatory constraints.

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Participants are able to change their Credit Limit if required. Note that the FAA Service is not part of the PTS, and thus participants should instead make requests to change their credit limit directly with the ECVAA – clearly the normal process for changing credit limits will not apply.

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8 MANUAL AND ELECTRONIC INPUTS

8.1 Manual Inputs

Manual input flows to the PTS are handled in a similar way to the live service. Participants need to complete the relevant form for all data changes (such as registration changes, authorisation requests etc). These forms are similar to the corresponding BSCP Forms, and are provided in Appendix A.

NOTE: A user will only need to use the manual forms if they are wishing to specifically practice the use of manual forms. CGI can change data data once notified by email.

Participants are able to change the authorised person for either or both of the test environments as required. It is thus possible to have different authorised person details on Live and PTE

The procedure for requesting data changes is based on the corresponding BSCP, but the timescales specified in the BSCP do not, in general, apply. However, participants should provide as much advance notice of data requests as possible – as a general rule, all data changes must be submitted by midday on the working day before the required effective from date.

The following manual input flows are supported. All other manual inputs will only be supported in prior agreement with CGI.

Flow ID	Flow Name	BSCP Form[1]	Comments
CDCA-I013	Response to Estimated Data	-	This mechanism will be used where a participant requires changes to the meter readings, which will then be input as estimates.
CRA-I001	Party Registration	BSCP65/4.1	Only for changes to Contact Details for Address
	Authorised Persons	BSCP 65/1A	Authorised Person Name will be checked – signatures will not
CRA-I002	IA Registration	BSCP65/4.1	Only for changes to Contact Details or Address.
CRA-I003	Agent Registration	BSCP65/4.1	Only for changes to Contact Details or Address.
CRA-I005	BMU Registration	BSCP 15/4.1	Only for changes to Demand Capacity or Generation Capacity.
CRA-I006	Trading Unit Registration	-	Only as agreed with ELEXON
CRA-I007	Boundary Point Registration	-	Only as agreed with ELEXON

[1] Modified versions of these forms are given in Appendix A.

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Flow ID	Flow Name	BSCP Form[1]	Comments
CRA-I011	CALF Values	Form 13 (See Appendix A)	Direct from participants for participant's BMUs
CRA-I027	GSP Group and GSP Registration	-	Only as agreed with ELEXON
CRA-I031	Meter System Data	-	Only as agreed with ELEXON
ECVAA-I002	ECVNAA Requests	BSCP71/01 BSCP71/03 BSCP71/09	No restrictions
ECVAA-I003	MVRNAA Requests	BSCP71/02 BSCP71/05 BSCP71/09	No restrictions
ECVAA-I006	Credit Limit Data	Form 12 (see Appendix A)	Direct from participants
ECVAA-I035	Forward Contract Report Start Period Override	-	No restrictions

It is not expected that there will be a need to submit any other manual flows. Where changes to data are required that are not covered by the above flows, the requirement should be discussed with ELEXON prior to booking a test slot.

In all cases these flows must be received by the PTS by midday on the working day before they become effective (at the latest). All other registration changes must be agreed with ELEXON before proceeding.

Participants should send these forms via email as Word file attachments to email address bscservicedesk@cgi.com or fax hard copies to ELEXON on 020 7380 4329.

The Test Service will aim to acknowledge the receipt of the emailed forms by email within 4 hours and faxed forms within 4 hours. Participants should contact the ELEXON if confirmation is not received within these times.

8.2 Electronic Inputs

The following electronic inputs are supported:

Flow ID	Flow Name	Comments
ECVAA-I004	ECV Notifications	Timing constraints as for live
ECVAA-I005	MVR Notifications	Timing constraints as for live

These flows will be validated in the normal way – including checks on the sequence number and checksum. The usual gate-closure constraints will also apply.

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The flows will be acknowledged (or negatively acknowledged) as appropriate. If submitted trades are commencing withing the next 72 hours the user will receive either an ECVAA –I028 or I029 as appropriate (provided these flows would be received in the participants live system). it is the responsibility of participants to ensure they only submit data during the allocated Test Slot.

In-coming flows must contain the correct test flag, as specified in section 6.2 – "TR01" for the PTS environment.

8.3 Simulated Manual Flow for Credit Cover

The PTS will not have an interface with the FAA and therefore will be set up with the Credit Limit information from the live environment as part of the standing data set up.

Participants wishing to change their Credit Limit conditions will be able to provide updated values via a 'simulated' manual update to the PTS. This is normally provided to the ECVAA from the FAA, however this will be simulated via a manual flow from participants to the test service. The simulated flow is based on ECVAA- I006: Receive Credit Limit Data and must include the following:-

Party Credit Limit Details:

BSC PARTY Id
Effective Settlement Date
Credit Limit (MWh)

Appendix A (Form 12) provides a form to be used for this flow.

It is important to note that the Credit Limit data is a MWh figure, which would normally be calculated by the FAA based on monetary values of Credit Cover and historic operational data. Participants will need to calculate this MWh figure themselves.

Participants should send this request to Test Service by email by mid-day on the working day prior to the day it should become effective. Alternatively, the form can be faxed to ELEXON.

Participants may also request that the Notification Rejection Flag for their Party ID is set, if this is required for particular credit limit tests. In the PTS, participants can request this change directly from ELEXON

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9 REPORTS AND ELECTRONIC OUTPUTS

The reports produced by the PTS are the same as those for the live service, although the schedule for the generation of reports may be different and change from time to time - test users will be notified of such changes via PTS Bulletins. The initial set-up is such that all reports are suppressed to all participants – reports are only enabled as requested by the participants (using a modified version of form BSCP 41/1).

Participants can decide whether they wish to enable some or all of their flows all the time, or just enable the flows during the times they are carrying out testing.

The following reports are supported:

Report ID	**Report Name**	**Schedule**
ECVAA-I007	ECVNA Feedback	As a result of Authorisation Changes
ECVAA-I008	MVRNA Feedback	As a result of Authorisation changes
ECVAA-I009	ECVN Feedback	In response to rejected notifications
ECVAA-I010	MVRN Feedback	In response to rejected notifications
ECVAA-I013	Authorisation Report	On request by users
ECVAA-I014	Notification Report	Dummy file only
ECVAA-I022	Forward Contract Report	Sent at Participants request
ECVAA-I028		Automatic
ECVAA-I029		Automatic
SAA-I014	Settlement Report	Dummy file only. Will not reflect any trades made during the session.

Acknowledgements for incoming and outgoing electronic flows are fully supported.

Ad-hoc reports for all of the above file types can be requested by participants during their Test Slots.

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APPENDIX A: FORMS FOR BOOKING AND MANUAL FLOWS

Forms:-

1. Booking Form for the Participant Test Service
2. Participant Test Service Agreement (Non-BSC Participant's only)

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FORM 1

Participant Test Service Booking Form

Please send your completed form to bscservicedesk@cgi.com

There is a **10 Working Day** (WD) lead time for test bookings

Party Details	
Company Name:	
Party ID(s):	
Party Agent ID(s):	
Party ID to be invoiced (no more than one):	
Contact Name:	
Email address:	
Telephone/Fax:	

Requested days/dates for use of PTS:

Tests slots are booked by ½ day sessions. AM session = 9am -1pm, PM session 1pm – 5pm

Enter the dates and times in the following table to indicate request:

	Monday	**Tuesday**	**Wednesday**	**Thursday**	**Friday**
Date					
Start time					
End Time					

Note: Every half day slot will be charged at £820 + VAT (2014/2015)

	High Grade	**Low Grade**
Connection		

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Detailed Description of Testing and Flows to be sent to PTS System:

Please indicate which flows you want to test:

ECVAA Test Flows Available					
Flow Name	**Description**	**Direction**	**Applicable to:**	**Submission method**	**Required?**
ECVAA-I002	Receive Energy Contract Volume Notification Agent Authorisation Data	Inbound	BSC Party, ECVNA	Manual	
ECVAA-I003	Receive Meter Volume Reallocation Notification Agent Authorisation Data	Inbound	BSC Party, MVRNA	Manual	
ECVAA-I004	Receive Energy Contract Volume Notifications	Inbound	ECVNA	Automatic	
ECVAA-I005	Receive Meter Volume Reallocation Notifications	Inbound	MVRNA	Automatic	
ECVAA-I007	Issue Energy Contract Volume Notification Agent Authorisation Feedback	Outbound	BSC Party, ECVNA	Manual/ Automatic	
ECVAA-I008	Issue Meter Volume Reallocation Notification Agent Authorisation Feedback	Outbound	BSC Party, MVRNA	Manual/ Automatic	
ECVAA-I009	Issue Energy Contract Volume Notification Feedback	Outbound	BSC Party, ECVNA	Automatic	
ECVAA-I010	Issue Meter Volume Reallocation Notification Feedback	Outbound	BSC Party, MVRNA	Automatic	
ECVAA-I013	Issue Authorisation Report	Outbound	BSC Party, ECVNA, MVRNA	Automatic	
ECVAA-I014	Issue Notification Report	Outbound	BSC Party, ECVNA, MVRNA	Automatic	
ECVAA-I017	Issue ECVAA Performance Report	Outbound	BSCCo Ltd	Manual	
ECVAA-I018	Receive Acknowledgements	Inbound	All automatic outbound IU	Automatic	
ECVAA-I019	Issue Acknowledgements	Outbound	All automatic inbound IU	Automatic	
ECVAA-I022	Forward Contract Report	Outbound	BSC Party	Automatic	

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ECVAA Test Flows Available					
Flow Name	**Description**	**Direction**	**Applicable to:**	**Submission method**	**Required?**
ECVAA-I024	Receive Credit Cover Minimum Eligible Amount Request	Inbound	BSC Party	Manual	
ECVAA-I025	Issue Credit Cover Minimum Eligible Amount Report	Outbound	BSC Party, FAA	Manual	
ECVAA-I028	Issue ECVN Acceptance Feedback	Outbound	BSC Party, ECVNA	Automatic	
ECVAA-I029	Issue MVRN Acceptance Feedback	Outbound	BSC Party, MVRNA	Automatic	
ECVAA-I035	Receive Forward Contract Report Start Period Override	Inbound	BSC Party	Manual	
ECVAA-I037	Receive Volume Notification Nullification Request	Inbound	BSC Party	Manual	
ECVAA-I038	Issue Volume Notification Nullification Confirmation Report	Outbound	BSC Party	Manual	
ECVAA-I039	Issue Nullification Completion Report	Outbound	BSC Party	Manual	

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SAA Test Flows Available					
Flow Name	**Description**	**Direction**	**Applicable to:**	**Submission method**	**Required?**
SAA-I012	Receive Dispute Notification	Inbound	BSC Party,	Manual	
SAA-I014	Issue Settlement Reports	Outbound	BSC Party,	Automatic	
SAA-I016	Publish Settlement Calendar	Outbound	BSC Party, BSC Party Agent,	Manual	
SAA-I018	Issue Dispute Reports	Outbound	BSC Party, BSCC Ltd, SO	Manual	
SAA-I021	Receive Acknowledgement of SAA Messages	Inbound	All automatic outbound IU	Automatic	
SAA-I022	Issue SAA Acknowledgement of Messages	Outbound	All automatic inbound IU	Automatic	

Need more information?

If you have any questions regarding the Participant Testing Service or require support with this form please contact the **BSC Service Desk** at bscservicedesk@cgi.com or call **0870 010 6950**.

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FORM 2

Participant Test Service Agreement

The Participant has requested use of the BSC Participant Testing Service (**PTS**). In consideration of the payment of the PTS fee by the person identified in the PTS booking form (**Participant**) to ELEXON as set out in the PTS booking form, ELEXON has agreed to provide the PTS on the basis of the following conditions.

Basis of Contract
The contract between the Participant and ELEXON is comprised of:

(a) These terms and conditions;
(b) The X-Sec End User Licence Agreement (a copy of which is attached hereto)
(c) The PTS booking form
(d) Any other document expressly referred to in these terms and conditions

Obligations
ELEXON shall procure that the testing services are provided on the dates agreed by the parties.

The Participant acknowledges that it is aware of the obligations imposed by Section O of the Balancing and Settlement Code and the Communications Requirements Document and agrees to be bound by those obligations insofar as they relate to the PTS.

Licence
ELEXON grants to you, a non-exclusive, non-transferable and limited licence to use the XSec Security Software Version 3.0 internally for the purposes of undertaking the Participant Testing only and this licence shall cease when such testing has been completed. Except as set out herein, the terms of such licence are as set out in the X-Sec End User Licence Agreement attached hereto.

Cancellation

If the Participant testing slot is cancelled within 1 working day of the beginning of the relevant slot ELEXON shall charge the participant the full charge.

Payment

The fees for the PTS shall be as set out in the PTS booking form. The Participant shall pay such fees within 30 days of receipt of an invoice.

If the Participant fails to make any payment due to ELEXON under the contract by the due date for payment , then the Participant shall pay interest on the overdue amount at the rate of 4% per cent per annum above Barclays Bank PLC's base rate from time to time. Such interest shall accrue on a daily basis from the due date until actual payment of the overdue amount, whether before or after judgment. The Participant shall pay the interest together with the overdue amount.

The Participant shall pay all amounts due under the contract in full without any set-off, counterclaim, deduction or withholding (except for any deduction or withholding required by law). ELEXON may at any time, without limiting its other rights or remedies, set off any amount owing to it by the Participant against any amount payable by ELEXON to the Participant.

Liability

Nothing in these conditions shall limit or exclude ELEXON's liability for:
(a) death or personal injury caused by its negligence, or the negligence of its employees, agents or subcontractors;
(b) fraud or fraudulent misrepresentation; or
(c) breach of the terms implied by section 2 of the Supply of Goods and Services Act 1982 (title and quiet possession).

Subject to the foregoing:
(a) ELEXON shall under no circumstances whatever be liable to the Participant, whether in contract, tort (including negligence), breach of statutory duty, or otherwise, for any loss of profit, or any indirect or consequential loss arising under or in connection with this contract; and
(b) ELEXON's total liability to the Participant in respect of all other losses arising under or in connection with the Contract, whether in contract, tort (including negligence), breach of statutory duty, or otherwise, shall in no circumstances exceed the fees paid by the Participant.

The terms implied by sections 3 to 5 of the Supply of Goods and Services Act 1982 are, to the fullest extent permitted by law, excluded from the contract.

This clause shall survive termination of the contract.

Termination

Without prejudice to any other provision of this contract and without limiting its other rights or remedies, either party may terminate the contract by giving the other party 7 day's written notice.

Confidentiality

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A party (**receiving party**) shall keep in strict confidence all technical or commercial know-how, specifications, inventions, processes or initiatives which are of a confidential nature and have been disclosed to the receiving party by the other party (**disclosing party**), its employees, agents or subcontractors, and any other confidential information concerning the disclosing party's business, its products and services which the receiving party may obtain. The receiving party shall only disclose such confidential information to those of its employees, agents and subcontractors who need to know it for the purpose of discharging the receiving party's obligations under the contract, and shall ensure that such employees, agents and subcontractors comply with the obligations set out in this clause as though they were a party to the contract. The receiving party may also disclose such of the disclosing party's confidential information as is required to be disclosed by law, any governmental or regulatory authority or by a court of competent jurisdiction. This clause shall survive termination of the contract.

5. General

Failure or delay by ELEXON in enforcing or partially enforcing any provision of the Contract will not be constituted as a waiver of any of its rights under the contract.

If any provision of the contract is found by anybody of competent jurisdiction to be wholly or partly illegal, invalid, unenforceable or unreasonable it shall to the extent of such illegality, invalidity, unenforceability or unreasonableness be deemed severable and the remaining provisions of the contract and the remainder of such provision shall continue in full force and effect.

This contract shall be governed by English law. Any dispute arising out of or in connection with the contract shall be subject to the exclusive jurisdiction of the English Court.

Signed on behalf of **ELEXON** by:

.....

NAME .....

POSITION.....

DATE.....

Signed on behalf of the **Participant** by:

.....

NAME .....

POSITION.....

DATE.....

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ELEXON LIMITED IS WILLING TO LICENCE XSEC TO YOU ONLY UPON THE CONDITION THAT YOU ACCEPT ALL OF THE TERMS CONTAINED IN THIS XSEC END USER LICENCE AGREEMENT ("LICENCE AGREEMENT"). PLEASE READ THE TERMS AND CONDITIONS OF THIS LICENCE AGREEMENT CAREFULLY BEFORE INSTALLING XSEC. BY INSTALLING XSEC, YOU ACCEPT THE TERMS AND CONDITIONS OF THIS LICENCE AGREEMENT AND IF YOU DO NOT ACCEPT THIS LICENCE AGREEMENT THEN YOU ARE NOT PERMITTED TO INSTALL THE LICENSED MATERIALS.

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4.0 SUPPORT
4.1 ELEXON Limited will provide you with support for the Licensed Materials in accordance with the agreement(s) between ELEXON Limited and its BSC Agent, provided that such agreement(s) is/are in place. You may request such support by contacting the BSC Service Desk.
4.2 Support in respect of earlier versions of the Licensed Materials shall be limited to the period expiring six calendar months after the release date of the Licensed Materials.

5.0 TERM AND TERMINATION OF AGREEMENT
5.1 This Licence Agreement shall commence on the date on which you install the Licensed Materials (the "Effective Date") and will remain in force unless terminated earlier as provided below.
5.2 Either party may terminate this Licence Agreement upon ten (10) days written notice to the other party. However, ELEXON Limited may terminate this Licence Agreement immediately should any Licensed Materials become, or in ELEXON Limited’s opinion be likely to become, the subject of a claim of infringement of a patent, trade secret or copyright.

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